

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Currently Amended) An alarm system intended to trigger an alarm signal upon deviation from at least one environment-dependent reference predetermined for a specific environment, the alarm system comprising:

at least one portable unit having a size not greater than a mobile telephone and intended to be placed in said environment, each portable unit comprising:

a sensor system ~~for recording~~ that records a normal state of the environment ~~while~~ when placed in the environment, the predetermined environment-dependent reference being comprised of at least a recorded sound/vibration image of the normal state of the environment in which the at least one portable unit is placed, the sensor system comprising an accelerometer/silicon crystal, microphone and temperature sensor, said accelerometer being triaxial,

a processor member connected to the sensor system ~~and adapted for the comparison of~~ that compares signals received from the sensor system and said predetermined environment-dependent reference and that causes an alarm to be triggered upon determining an occurrence of a predetermined deviation of the signals received from the sensor system from the predetermined environment-dependent reference,

a communication member of a unique identity connected to the processor member ~~and adapted~~ for wireless communication at least upon the triggering of ~~an~~ the alarm signal, and

a positioning member connected to the processor member ~~and adapted to indicate that indicates,~~ at least upon the triggering of an alarm signal, the position of said unit, and

a memory member connected to the processor member via a distributed computer network, the memory member ~~being adapted for the storage of storing~~ said predetermined reference for dynamic and interactive update and development for different purposes by manoeuvring via fixed and/or mobile telephony and/or radio and/or computer unit.

2. (Currently Amended) The alarm system according to claim 1, wherein each sensor system further comprises at least one of the following sensors: frequency transmitters, strain gauges, a camera, UV/photocells, electronic noses, anemometers, infrared sensors, gamma transducers, laser sensors, inductive sensors, flow sensors, level transducers, tension gauges and pressure gauges.

3. (Currently Amended) The alarm system according to claim 1, wherein each positioning member ~~consists~~ is comprised of at least one of the following units: GPS unit, GPRS unit and GSM unit.

4. (Cancelled)
5. (Previously Presented) The alarm system according to claim 1, wherein each portable unit comprises at least one basic module, as well as a protecting cover.
6. (Currently Amended) The alarm system according to claim 1, wherein the memory member ~~is adapted for continuous storage of continuously stores~~ comparisons and/or ~~continuous storage of~~ deviations.
7. (Currently Amended) The alarm system according to claim 1, wherein the memory member ~~e~~onists is comprised of a database.
8. (Currently Amended) A method for triggering an alarm signal by means of an alarm system comprised of at least one portable unit having a size not greater than a mobile telephone and intended to be placed in an environment, each portable unit comprising a sensor system ~~for recording an~~that records a sound/vibration image of a normal state of the environment in which the at least one portable unit is placed while the portable unit is in the environment, the sensor system comprising an accelerometer/silicon crystal, microphone and temperature sensor, the accelerometer being triaxial, a processor member connected to the sensor system ~~and adapted for the comparison of~~that compares signals received from the sensor system and a recorded

predetermined environment-dependent reference, a communication member of a unique identity connected to the processor member and adapted for wireless communication at least upon the triggering of an alarm signal, and a positioning member connected to the processor member and adapted to indicate, at least upon the triggering of an alarm signal, the position of said unit, a memory member connected to the processor member via a distributed computer network, and for dynamic and interactive update and development for different purposes by manoeuvring via fixed and/or mobile telephony and/or radio and/or computer unit , the method comprising the steps of:

- by means of the sensor system, detecting different states comprising vibrations, relative position changes, accelerations and temperature, wherein said accelerations are detected against three axes;
- comparing the signals received from the sensor system and the at least one environment-dependent reference predetermined for a specific environment and stored in the memory member, the predetermined environment-dependent reference being at least the a sound/vibration image of the recorded normal state of the environment in which the at least one portable unit is placed;
- upon deviation of signals received from the sensor system from said environment-dependent reference, triggering an alarm signal; and
- according to instantaneous control or predetermined configuration, by means of the communication member of a unique identity, transmitting a message to at least one receiver; and

- according to instantaneous control or predetermined configuration, by means of the positioning member, determining the position of the unit;
- transmitting the position to the at least one receiver; and
- dynamically and interactively updating and developing said memory member for different purposes by manoeuvring via fixed and/or mobile telephony and/or radio and/or computer unit.

9. (Currently Amended) The method according to claim 8, wherein the detection step comprises:

- detecting different states by means of an accelerometer/silicon crystal, microphone and a temperature sensor.

10. (Currently Amended) The method according to claim 9, wherein the detection step further comprises:

- detecting different states by means of the following sensors: frequency transmitters, strain gauges, a camera, UV/photocells, electronic noses, anemometers, infrared sensors, gamma transducers, laser sensors, inductive sensors, flow sensors, level transducers, tension gauges and pressure gauges.

11. (Previously Presented) The method according to claim 8, wherein the positioning step comprises:

- determining the position by means of at least one of the following units: GPS unit, GPRS unit and GSM unit.

12. (Currently Amended) The method according to claim 8, wherein the method further comprises the step of:

- registering, and in the memory member, storing the environment-dependent reference which ~~consists of a~~ is comprised of the sound/vibration image that is specific to each the portable unit.

13. (Previously Presented) At least one computer software product directly downloadable in the internal memory of at least one digital computer, comprising software code portions for executing the steps according to claim 8 when said at least one product is run on said at least one computer.

14. (Previously Presented) The alarm system according to claim 1, wherein the state comprises at least one of vibrations, relative position changes or accelerations.

15. (Previously Presented) The alarm system according to claim 1, wherein the predetermined environment-dependent reference is default settings for the portable unit supplemented by the recorded normal state of the environment.

16. (Previously Presented) The alarm system according to claim 1, wherein the sensor system is comprised of a plurality of different environment-dependent sound/vibration sensors.

17. (Previously Presented) The alarm system according to claim 1, wherein the sensor system is comprised of a plurality of different types of sensors and wherein an alarm signal is triggered when at least three different types of sensors simultaneously detect deviation from corresponding predetermined environment-dependent references stored in the memory member.

18. (Previously Presented) The alarm system according to claim 1, wherein the recorded image is a sound/vibration image.

19. (Currently Amended) The alarm system according to claim 1, wherein the recorded image is a recording of ~~a magnitude-an amplitude~~ of at least one parameter of the normal state of the environment varying over a specified period.

20. (Currently Amended) The method according to claim 8, wherein the recorded image is a sound/vibration image only.

21. (Currently Amended) The method according to claim 8, wherein the recorded image is a recording of ~~a magnitude~~ an amplitude of at least one parameter of the normal state of the environment varying over a specified period.